

ABSTRACT OF THE DISCLOSURE

An automated computerized scheme for determination of the likelihood of malignancy in pulmonary nodules. The present invention includes steps of obtaining at least one computed tomography medical image of a pulmonary nodule in determining if the pulmonary nodule is malignant based on the examination of seven patient or image features. The method can be implemented when instructions are loaded into a computer to program the computer. The significance of employing seven patient or image features is that statistically, seven features are the most practical based on the unique implementation of statistical analysis. Out of the seven features that are now analyzed to determine if a pulmonary nodule is malignant, these features are selected to optimize the accuracy of the diagnosis of a pulmonary nodule. Through a unique sampling scheme, different embodiments of the present invention utilize different combinations of features to optimize the accuracy of the method of the present invention.